

This listing of claims will replace all prior versions, and listings, of claims in the application.

LISTING OF CLAIMS

Claim 1 (Currently Amended): A method for verifying that data received by a receiver apparatus have been sent by a transmitter authorized by a trusted third party to transmit the data, the transmitter and the receiver apparatus being connected to a digital network, the method performed by ~~for~~ the receiver apparatus comprising:

(a) receiving, at the receiver apparatus, the data and an identifier for the data;

(b) generating a random number;

(c) broadcasting said random number and said identifier over the network;

(d) receiving from the transmitter a response computed by applying a first function to said random number and to said identifier;

(e) verifying the received response by applying a second function to the received response, to said random number and to said identifier;

the first function having previously been delivered to the transmitter by the trusted third party and the second function being a function for verifying the result of the first function, previously delivered by the trusted third party to the receiver apparatus;

wherein the receiver apparatus does not know the identity of the transmitter.

Claim 2 (Previously Presented): The method as claimed in claim 1, in which the step (c) is replaced by a step comprising sending said random number to the transmitter.

Claim 3 (Cancelled)

Claim 4 (Currently Amended): The method as claimed in claim 1, wherein the receiver apparatus inhibits access to said data if the response received in the step (d) is not correct or if no response is received after the expiry of a predetermined time starting from the transmission of the random number.

Claim 5 (Currently Amended): A method for proving that data sent to a receiver have been transmitted by a transmitter apparatus authorized by a trusted third party to transmit the data, the transmitter apparatus and the receiver being connected to a digital network, wherein an identifier is associated with the data sent by the transmitter apparatus, the method for the transmitter apparatus comprising:

(a) sending, from the transmitter apparatus, the data and the identifier for the data to the receiver that does not know the identity of the transmitter apparatus;

(b) receiving a random number from the receiver;

(c) computing a response by applying a first function to said random number and to said identifier;

(d) sending said response to the receiver;

said response being verified by the receiver by applying a second function to the received response, to said random number and to said identifier;

the first function having previously been delivered to the transmitter apparatus by the trusted third party and the second function being a function for verifying the result of the first function, previously delivered by the trusted third party to the receiver.

Claim 6 (Currently Amended): The method as claimed in claim 5, in which the transmitter apparatus also receives in step (b) the identifier associated with the data and in which the steps (c) and (d) are not carried out unless said identifier received in the step (b) corresponds to the identifier associated with the data that the transmitter apparatus has just sent.

Claim 7 (Currently Amended): The method as claimed in claim 1, wherein the identifier associated with the data sent by the transmitter apparatus is a random number generated by the initial transmitter of the data in the network and attached to said data by the initial transmitter.

Claim 8 (Previously Presented): The method as claimed in claim 1, wherein the first function is a public function using a secret key.

Claim 9 (Previously Presented): The method as claimed in claim 8, wherein the second function is a boolean function and further comprising:

 computing an expected response by applying to said random number
 and to said identifier the first function with the secret key and
 comparing the expected response with the response received in order to
 deliver:

- a "0" value if the expected and received responses are different
- and
- a "1" value if the expected and received responses are equal.

Claim 10 (Previously Presented): The method as claimed in claim 1, wherein the first function is a secret function.

Claim 11 (Previously Presented): The method as claimed in claim 10, wherein the second function is a boolean function and further comprising:

 computing an expected response by applying the first function to
 said random number and to said identifier and
 comparing the expected response with the received response in
 order to deliver:

- a "0" value if the expected and received responses are different
- and
- a "1" value if the expected and received responses are equal.

Claim 12 (Previously Presented): The method as claimed in claim 1, wherein the first function is a public function for signature generation with the aid of a private key.

Claim 13 (Previously Presented): The method as claimed in claim 12, wherein the second function is a public function for signature verification with the aid of a public key corresponding to the private key used by the first function.